APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/549,358	09/14/2005	Patrick B Farley	36-1924	5464

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EXAMINER
HUSSAIN, IMAD

ART UNIT	PAPER NUMBER
2451	

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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

PTOL-90A (Rev. 04/07)

	Application No.	Applicant(s)
	10/549,358	FARLEY ET AL.
Office Action Summary	Examiner	Art Unit	
	IMAD HUSSAIN	2451	

-- *The MAILING DATE of this communication appears on the cover sheet with the correspondence address* --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE <u>3</u> MONTH(S) OR THIRTY (30) DAYS,
WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.
- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed
  after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
  Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any
  earned patent term adjustment. See 37 CFR 1.704(b).

Status

1) ☒ Responsive to communication(s) filed on <u>22 June 2009</u>.

2a) ☒ This action is **FINAL.**   2b) ☐ This action is non-final.

3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is
   closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4) ☒ Claim(s) <u>2,8-10,16-18 and 21</u> is/are pending in the application.

   4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5) ☐ Claim(s) _____ is/are allowed.

6) ☒ Claim(s) <u>2,8-10,16-18 and 21</u> is/are rejected.

7) ☐ Claim(s) _____ is/are objected to.

8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9) ☐ The specification is objected to by the Examiner.

10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.

   Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

   Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

   a) ☐ All   b) ☐ Some * c) ☐ None of:

   1. ☐ Certified copies of the priority documents have been received.

   2. ☐ Certified copies of the priority documents have been received in Application No. _____.

   3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage
      application from the International Bureau (PCT Rule 17.2(a)).

   * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)

2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)

3) ☐ Information Disclosure Statement(s) (PTO/SB/08)
   Paper No(s)/Mail Date _____.

4) ☐ Interview Summary (PTO-413)
   Paper No(s)/Mail Date. _____.

5) ☐ Notice of Informal Patent Application

6) ☐ Other: _____.

DETAILED ACTION

1.   Applicant's submission filed on 22 June 2009 has been entered.

2.   Claims 1, 2, 8-10, 16-18 and 21 have been amended. Claims 4, 5, 12, 13 and 22

have been cancelled.

3.   Claims 1, 2, 8-10, 16-18 and 21 are pending in Application 10/549358.

Response to Arguments

4.   Applicant's arguments, see page 7 of Applicant's Arguments/Remarks,

filed 22 June 2009, with respect to the rejection(s) of claim(s) 1, 2, 8, 9, 10, 16, 17,

18 and 21 under 35 USC 103(a) have been fully considered and are persuasive.

Therefore, the rejection has been withdrawn. However, upon further

consideration, a new ground(s) of rejection is made in view of David B. Lindquist

et al. (US 2003/0233602 A1, hereinafter *Lindquist*).

Applicant argues that the cited references do not teach or suggest the use of WSDL and

SOAP.

        Examiner agrees with the Applicant. However, Lindquist teaches the use of

WSDL and SOAP in a failover environment [Lindquist: Paragraph 0005 and Claim 2].

5.   Applicant's arguments been fully considered but they are not persuasive.

Applicant argues that Nozaki-Ahuja fails to show certain features of the applicant's invention.

In response to applicant's argument that the references fail to show certain features of applicant's invention, it is noted that the features upon which applicant relies (i.e., "throttle-back", "the IMSS configures the IMCS to poll it at regular, defined periods") are not recited in the rejected claim(s). Although the claims are interpreted in light of the specification, limitations from the specification are not read into the claims. See *In re Van Geuns*, 988 F.2d 1181, 26 USPQ2d 1057 (Fed. Cir. 1993).

Applicant additionally argues that the system of Nozaki-Ahuja would not support SOAP services.

Examiner notes that Lindquist's "fail-over of Web service instances" does support SOAP services [Lindquist: Figure 3B and Paragraphs 0005 and 0035].

Claim Objections

6.   Applicant is advised that should claim 18 be found allowable, claim 21 will be objected to under 37 CFR 1.75 as being a substantial duplicate thereof. When two claims in an application are duplicates or else are so close in content that they both cover the same thing, despite a slight difference in wording, it is proper after allowing one claim to object to the other as being a substantial duplicate of the allowed claim. See MPEP § 706.03(k).

Claim Rejections - 35 USC § 103

7.   The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all

obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in
section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are
such that the subject matter as a whole would have been obvious at the time the invention was made to a
person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived
by the manner in which the invention was made.

8.   Claims 1, 8, 9, 16-18, and 21 are rejected under 35 U.S.C. 103(a) as being

unpatentable over Hideki Nozaki (US 6128644 A, hereinafter *Nozaki*) in view of

Ahuja et al (US 6175869 A) (hereinafter *Ahuja*) in further view of David B.

Lindquist et al. (US 2003/0233602 A1, hereinafter *Lindquist*).

Regarding claims 1, 9, 18 and 21, Nozaki discloses *a method and system of managing*

service requests from a client module to a plurality of server modules [Nozaki: Abstract]*,*

the method comprising:

          repeatedly receiving, at least one separate information-collating monitor module

[Nozaki: "server status management means 5a"]*, from each of plural server modules, an*

indication of the current operational status of each of the server modules, said

operational status comprising current loading information associated with the server

modules [Nozaki: Column 5 Lines 49-54]*;*

          receiving, at a control intermediary [Nozaki: "request distribution means 6a"]

associated with a client module, from at least one said information-collating monitor

module, an indication of the current operational status of each of the server modules

[Nozaki: Column 6 Lines 4-9]*;*

selecting, by the control intermediary, of one of the server modules for directing a
service request to from the therewith-associated client module based on the received
indications of operational status of the server modules [Nozaki: Column 6 Lines 12-16].

Nozaki does not explicitly disclose the control intermediary repeating the step of
selecting one of the server modules for directing a service request to from the therewith-
associated client module, so as to identify an alternative server module based on the
received loading information, in the event that the transmission of the service request to
the earlier selected server module fails.

However, Ahuja discloses the control intermediary repeating the step of selecting
one of the server modules for directing a service request to from the therewith-
associated client module, so as to identify an alternative server module based on the
received loading information, in the event that the transmission of the service request to
the earlier selected server module fails [Ahuja: "detects non-responsive servers and
transparently redirects requests to other replicated servers in the server pool", Column 3
Lines 11-12].

Nozaki and Ahuja are analogous art in the same field of endeavor as both
describe load balancing systems. It would have been obvious for one of ordinary skill in
the art at the time the invention was made to utilize the repetition scheme of Ahuja for
repeating the determination of the best server in the case of server failures in the
system of Nozaki. One of ordinary skill in the art would have been motivated to modify
the load balancing system of Nozaki with the repetition scheme of Ahuja because in
doing so, the system would allow for resilience in the case of server failures.

The combination of Nozaki and Ahuja (hereinafter *Nozaki-Ahuja*) does not explicitly disclose the use of *Web Service Description Language (WSDL) in a Simple Object Access Protocol (SOAP)*.

However, Lindquist teaches the use of *Web Service Description Language (WSDL) in a Simple Object Access Protocol (SOAP)* [Lindquist: Paragraph 0005].

Nozaki-Ahuja and Lindquist are analogous art in the same field of endeavor as both describe web service fail-over systems. It would have been obvious for one of ordinary skill in the art at the time the invention was made to utilize the WSDL/SOAP scheme of Lindquist for implementing services as well-known in the art [Lindquist: Paragraph 0005] in the system of Nozaki-Ahuja. One of ordinary skill in the art would have been motivated to modify the failsafe system of Nozaki-Ahuja with the WSDL/SOAP scheme of Lindquist because in doing so, the system would allow for easier creation and interoperability of web service technologies.

Regarding claims 8 and 16, the combination of Nozaki-Ahuja and Lindquist (hereinafter *Nozaki-Ahuja-Lindquist*) discloses that *the control intermediary periodically polls the information-collating module to obtain the indications of the operational status of the SOAP server modules* [Nozaki: Claim 4; Ahuja: the information-collating module "periodically collects information about the load offered to each server in the pool by contacting the corresponding server agent", Column 12, Lines 30-33; Lindquist: Paragraph 0013].

Regarding claim 17, Nozaki-Ahuja-Lindquist discloses that *the SOAP modules are Web service servers* [Nozaki: "WWW system", Abstract; Ahuja: "a client request directed to a web site or other service", Abstract; Lindquist: Paragraph 0005].

9.   **Claims 2 and 10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Nozaki-Ahuja-Lindquist as applied to claims 1 and 9 in further view of Stricek (*A Reverse Proxy is A Proxy By Any Other Name*) (hereinafter *Stricek*).**

Regarding claims 2 and 10, Nozaki-Ahuja-Lindquist discloses a method and system according to claims 1 and 9 *in which the first module comprises a client application* [Ahuja: "web browsers", Column 8, Line 16] *and the control intermediary* [Nozaki: "server status management means 5a", Column 5 Lines 49-54], *the method further comprising:*

   receiving at the control intermediary a request for a Web service description from the client application, and selecting one of the other modules to direct the request to based on the indications of operational status of the other modules [Ahuja: Abstract];

   the control intermediary receiving the requested Web service description and passing the description to the client application [Ahuja: Abstract and Column 5, lines 18-19].

   Nozaki-Ahuja-Lindquist does not explicitly disclose *substituting an identifier of the control intermediary into the description* passed to the client application.

However, Stricek teaches the process of *substituting an identifier* ("reference") *of a control intermediary* ("reverse proxy") *into the description* passed to the client application ("client") [Stricek: Page 4, Lines 8-13].

Nozaki-Ahuja-Lindquist and Stricek are analogous subject matter in the same field of endeavor as both network routing mechanisms. One of ordinary skill in the art at the time the invention was made would have been motivated to modify the client side agent taught in Nozaki-Ahuja-Lindquist with the identifier substitution taught in Stricek because doing so creates a single point of access from the client's point of view [Stricek: Page 1, Lines 28-29] and further allows for eliminating the duplication of hardware [Stricek: Page 2, Lines 9-10]. Nozaki-Ahuja-Lindquist also states that the client agent may be treated as a proxy [Ahuja: Column 8, Lines 23-25], that the services grid can act as a proxy [Lindquist: Paragraph 0020], and further that the client agent may be used with proxies [Ahuja: Column 8, Lines 34-35], suggesting the desirability of such a combination. Therefore, the invention as a whole would have been obvious to one of ordinary skill in the art at the time the invention was made.

Conclusion

10.   Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE
MONTHS from the mailing date of this action. In the event a first reply is filed within
TWO MONTHS of the mailing date of this final action and the advisory action is not
mailed until after the end of the THREE-MONTH shortened statutory period, then the
shortened statutory period will expire on the date the advisory action is mailed, and any
extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of
the advisory action. In no event, however, will the statutory period for reply expire later
than SIX MONTHS from the date of this final action.

11.   **Examiner's Note:** Examiner has cited particular columns and line numbers in
the references applied to the claims above for the convenience of the applicant.
Although the specified citations are representative of the teachings of the art and are
applied to specific limitations within the individual claim, other passages and figures
may apply as well. It is respectfully requested from the applicant in preparing responses
to fully consider the references in entirety as potentially teaching all or part of the
claimed invention, as well as the text of the passage taught by the prior art or disclosed
by the examiner.

In the case of amending the claimed invention, Applicant is respectfully
requested to indicate the portion(s) of the specification which dictate(s) the structure
relied on for proper interpretation and also to verify and ascertain the metes and bounds
of the claimed invention.

Any inquiry concerning this communication or earlier communications from the
examiner should be directed to IMAD HUSSAIN whose telephone number is (571) 270-

3628. The examiner can normally be reached on Monday through Friday from 0800 to 1700.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Follansbee can be reached on (571) 272-3964. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/I. H./
Imad Hussain
Examiner, Art Unit 2451

/Salad Abdullahi/

Primary Examiner, Art Unit 2457